Document Overview

This Document Overview provides a brief summary of the contents of the eleven sections included in Baltimore County's NPDES 2008 Annual Report. The major changes in this report this year include changes in the pollutant load calculations (Section 10.2), pollutant load reduction calculations, tracking progress in meeting Total Maximum Daily Loads (TMDLs) and the Maryland Tributary Strategies. Most of this changes occur in Section 10.

Section 1: Stormwater Management Program

Baltimore County implements a stormwater management program in accordance with the Annotated Code of Maryland, including implementation of the Maryland Stormwater Design Manual. This section of the report includes data on the number of plans reviewed and fees-in-lieu money received. There is information on the number of approved stormwater facilities and the type of facilities as well as the acreage of drainage area controlled by these facilities. This assists in determining watersheds in the County that may need additional stream erosion protection from stormwater. Data is also provided on inspections of facilities and the number and types of maintenance activities. The pollutant load reductions that result form the stormwater management program are calculated, as well as, the amount of impervious surface addressed through water quality stormwater management. This information fulfills section E.1 and E.2 of the NPDES permit.

Section 2: Sediment Control Program

Baltimore County implements a sediment control program in accordance with the Annotated Code of Maryland. This section of the report includes data on the number of plans reviewed and permits issued. Data is provided on the acreage of disturbed area and is categorized by watershed. Trends in the numbers of building and grading permits are examined. A summary of the number of inspections and enforcement actions is included. This section fulfills section E.4 of the NPDES permit.

Section 3: County Property Management, Road Maintenance and Recycling Activities

The activities accounted for in this section of the report are implemented by both the Department of Public Works (DPW) and the Department of Environmental Protection and Resource Management (DEPRM). Activities accounted for include; the Vac-Con Stormdrain Cleaning Program, the Street Sweeping Program, and hazardous waste recycling programs. This section includes a summary of the County Property Management as it relates to acquiring Industrial Stormwater General permits and preparation of Pollution Prevention Plans. Also reported in this section is data on the use of fertilizer, pesticide and deicing materials. This fulfills the NPDES permit requirement for section E.5 and E.6.

Section 4: Education Program

Baltimore County implements and maintains a public education and outreach program to reduce stormwater pollutants. Information provided in this section includes DEPRM's partnerships with other State programs, County level programs, as well as all interested local watershed groups. Baltimore County continues to lead the State in the number of

State Green School awards and implements a highly successful Tree-mendous Maryland program. DEPRM continues to expand its outreach to local school administrative staff through workshops. This program fulfills the requirements of section E.7 of the NPDES permit.

Section 5: Illicit Connections Program

This section of the NPDES report summarizes the detection, investigation, and remediation of illicit connections to the County's storm drain system. Data is provided on routine screenings and complaint investigations. Outfall screenings are presented by distribution priority and quantitative and qualitative problems. Details on complaint investigation results are separately listed. This information meets the requirements in section E.4 of the County's NPDES permit.

Section 6: Geographic Information System and Databases

This section describes the Geographic Information System (GIS) information and databases submitted with the report.

Section 7: Watershed Planning and Restoration Program

The Watershed Restoration Program continues to systematically assess the water quality within all of its urban watersheds. The data provided in this section satisfies, in part, section F. and G. requirements of the NPDES permit. A status is provided on watershed plans, the associated costs and the development of small watershed action plans. Documentation of capital restoration projects constructed by DEPRM is provided for each watershed. The summary includes the costs of each project and the projected pollutant reduction. Also included is an accounting of the amount of impervious surfaces addressed by DEPRM's capital restoration projects. Baltimore County is required to provide restoration of 10% of its impervious surfaces during this five-year permit period. The section also includes updates on the status of TMDL development for the various watersheds.

Section 8: Discharge Characterization and Assessment of Controls

This section describes the Scotts Level Branch monitoring plan and provides an analysis of the chemical, biological and geomorphological data. The section also presents the data derived from Windlass Run.

The Scotts Level Brach long-term monitoring site has been paired with sites in Upper Gwynns Falls and Powder Mill Run in a paired watershed design. The intent of this paired watershed design is to determine restoration effectiveness on a subwatershed scale in the realms of chemical load reduction, improvement in the biological community, and changes in stream erosion rates. The design will also determine the relative proportion of chemical pollutant load attributed to watershed washoff and stream erosion.

The ongoing Windlass Run monitoring to determine the effectiveness of the 2000 Maryland Stormwater Design Manual is presented in this section this year. Previously, it had been accorded its own section. This section meets the reporting requirements for section H in the NPDES permit.

Section 9: Watershed and Restoration Monitoring

This section combines provides analysis of the chemical, biological, and geomorphological collected exclusive of the Scotts Level Branch and Windlass Run monitoring sites. In addition, a section on Submerged Aquatic Vegetation (SAV) data collected by the County has been included. The section summarizes chemical data collected through the County baseflow and tidal water monitoring program. It also summarizes the results from the stream restoration geomorphological monitoring program. Included are the results of the Stream Stability Assessments conducted during the reporting year. The portion of the report on the biological data includes results from the County Probabilistic Monitoring Program, stream restoration biological monitoring, and reference site monitoring. The SAV data is compared to the new Water Quality Standards for SAV coverage. The data provided in this section satisfies, in part, section F. and G. requirements of the NPDES permit.

Section 10: BMP Pollutant Load Reduction

Information provided in this section will meet the requirements of the NPDES Permit Part IV. Section A.1.e. The section summarizes the pollutant load reduction due to implementation of management programs. Much of the information will have already been provided in detail in the sections of the various management programs (Stormwater Management, Road Maintenance, and Watershed Restoration). This section provides the summary by watershed on the progress made in meeting pollutant load reductions from urban non-point sources.

There are a number of programs for which pollutant load reductions are not calculated or are only partially calculated e.g. Education, Illicit Connections, Street Sweeping (partial) and Storm Drain Cleaning (partial). This is due to the lack of information on the load reduction to allocate to those activities. The County in collaboration with others is making an effort to determine the effectiveness of storm drain and street sweeping program elements to correct the gap in knowledge on effectiveness. The determination of pollutant load reduction due to education activities and from the illicit connection program will be a more difficult undertaking.

Section 11: Permit Administration, Legal Authority, and Fiscal Analysis

This section includes the financial information regarding the County's capital, operational and maintenance expenditures related to compliance with the NPDES permit. Data is provided pertaining to DEPRM's organization and budgets. It also includes the county organization to address the NPDES permit requirements and an update on any legal authority changes. This portion of the report meets the requirements of sections A, B, and I. in the NPDES permit.